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July 26, 2018

Semiannual ZZZZ Compliance and Deviation Report
1H2018, January 1, 2018 – June 30, 2018
Uintah County, UT

Office of Enforcement
Compliance & Environmental Justice

Tracking #: 1Z6T36713598674444

Ms. Alexis North
U.S. EPA – Enforcement Division
1595 Wynkoop (8P-AR)
Denver, CO 80202

Dear Ms. North:

XTO Energy, Inc. hereby submits the Semi-annual ZZZZ Compliance and Deviation Report for January 1, 2018 – June 30, 2018. The reports satisfies the regulatory reporting requirements in 40 CFR 63.6650(b)(3) and (4), 40 CFR 63.6650(e)(1) - (12), 40 CFR 63.10(d)(5)(i), and 40 CFR 63.10 (e)(3)(vi) for the following major source facilities:

- Tap-5 Facility

Should you have any questions regarding this submittal, please feel free to contact me by phone at 832-625-0106 or by email at ethan_boor@xtoenergy.com.

Sincerely,

A handwritten signature in blue ink, appearing to read "Ethan Boor".

Ethan Boor
Environmental Engineer
XTO Energy, Inc.

WCA/encl

CERTIFICATION OF TRUTH, ACCURACY, AND COMPLETENESS (CTAC)

This form must be completed, signed by the "Responsible Official" designated for the facility or emission unit, and sent with each submission of documents (i.e., application forms, updates to applications, reports, or any information required by a part 70 or 71 permit).

A. Responsible Official

Name: (Last) Hermann (First) Timothy (MI) L

Title XTO Energy Inc. - Manager of MSO Western Division Operations

Street or P.O. Box 22777 Springwoods Village Pkwy

City Spring State TX ZIP 77389 -

Telephone (832) 625-0125 Ext. Facsimile

B. Certification of Truth, Accuracy and Completeness (to be signed by the responsible official).

I certify under penalty of law that this document and all attachments were prepared under my supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete.

Name (signed) 

Name (typed) Timothy L. Hermann Date: 7/26/2018

**INSTRUCTIONS FOR CTAC
CERTIFICATION OF TRUTH, ACURACY, and COMPLETENESS**

This form is for the responsible official to certify that submitted documents (i.e., permit applications, updates to application, reports, and any other information required to be submitted as a condition of a permit) are true, accurate, and complete.

This form should be completed and submitted with each set of documents sent to the permitting authority. It may be used at time of initial application, at each step of a phased application submittal, for application updates, as well as to accompany routine submittals required as a term or condition of a permit.

Section A - Title V permit applications must be signed by a responsible official. The definition of responsible official can be found at ' 70.2.

Section B - The responsible official must sign and date the certification of truth, accuracy and completeness. This should be done after all application forms are complete and the responsible official has reviewed the information. Normally this would be the last form completed before the package of forms is mailed to the permitting authority.

Semiannual Compliance Report – 40 CFR 63.6650(b) (3) and (4)

Compliance Report Required Information – 40 CFR 63.6650 (c)(1) – (6):

- (1) **Company Name and Address** – *XTO Energy Inc. 22777 Springwoods Village Pkwy. Spring, TX 77389.*
- (2) **Responsible Official CTAC statement** – *Please see attached CTAC Form.*
- (3) **Date of the report and beginning and ending dates of the reporting period** – Report Date: *July 30, 2018; Reporting Period: January 1, 2018 – June 30, 2018.*
- (4) **Malfunctions** - *Exceptions to compliance with 40 CFR 63, subpart ZZZZ related to startup, shutdown, or malfunctions during the monitoring period January 1, 2018 – June 30, 2018 are provided in the Attached Tables 1 & 2 and include the information in 40 CFR 63.10(d)(5)(i):*
- (5) **If there are no deviations from any emissions or operating limitations that apply to you, a statement that there were no deviations from the emission or operating limitations during the reporting period.**

Please refer to the attached Tables 1 & 2 for a list of the deviations.

- (6) **If there were no periods during which the continuous monitoring system (CMS), including CEMS and CPMS, was out-of-control, as specified in §63.8(c)(7), a statement that there were no periods during which the CMS was out-of-control during the reporting period.**

Periods where the CPMS experienced malfunctions during the reporting period are noted in the attached Tables 1 & 2.

Semiannual Compliance Report – 40 CFR 63.6650(e) (1) - (12)

Compliance Report Required Information – 40 CFR 63.6650 (e)(1)-(12):

For each deviation from an emission or operating limitation occurring for a stationary RICE where you are using a CMS to comply with the emission and operating limitations in this subpart, you must include information in paragraphs (c)(1) through (4) and (e)(1) through (12) of 40 CFR 63.6650.

- (1) **The date and time that each malfunction started and stopped** – *Please refer to the attached Tables 1 & 2.*
- (2) **The date, time, and duration that each CMS was inoperative, except for zero (low-level) and high-level checks** - *Please refer to the attached Tables 1 & 2.*
- (3) **The date, time, and duration that each CMS was out-of-control, including the information in §63.8(c)(8)** – *Please refer to the attached Tables 1 & 2.*
- (4) **The date and time that each deviation started and stopped, and whether each deviation occurred during a period of malfunction or during another period** – *Please refer to the attached Tables 1 & 2.*
- (5) **A summary of the total duration of the deviation during the reporting period, and the total duration as a percent of the total source operating time during that reporting period** – *Please refer to the attached Tables 1 & 2*
- (6) **A breakdown of the total duration of the deviations during the reporting period into those that are due to control equipment problems, process problems, other known causes, and other unknown causes** – *Please refer to the attached Tables 1 & 2.*
- (7) **A summary of the total duration of CMS downtime during the reporting period, and the total duration of CMS downtime as a percent of the total operating time of the stationary RICE at which the CMS downtime occurred during that reporting period** – *Please refer to the attached Tables 1 & 2.*
- (8) **An identification of each parameter and pollutant (CO or formaldehyde) that was monitored at the stationary RICE** – *Parameters monitored for each stationary RICE covered by this report include the oxidation catalyst inlet temperatures monitored on a continuous rolling 4-hour average and the monthly monitoring of differential pressure across the oxidation catalyst.*

Semiannual Compliance Report – 40 CFR 63.6650(e) (1) - (12)

- (9) **A brief description of the stationary RICE** – *Please refer to the attached Table 2.*
- (10) **A brief description of the CMS** – *A CPMS Performance Evaluation, which includes a description of the CMS, was conducted on February 12, 2018. Results of the CPMS Performance Evaluation performed on February 12, 2018.*
- (11) **The date of the latest CMS certification or audit** – *A minimum of semi-annual calibrations are conducted on CPMS monitoring equipment. A CPMS Performance Evaluation was conducted on February 12, 2018.*
- (12) **A description of any changes in CMS, processes, or controls since the last reporting period.**
 - *No changes in CMS, processes or controls occurred during this reporting period.*

Summary Report – Gaseous and Opacity Excess Emission and Continuous Monitoring System Performance – 40 CFR 63.10(e)(3)(vi)

Compliance Report Required Information – 40 CFR 63.10 (e)(3)(vi) (A) – (M):

- (A) **Company name and address of the affected source** – *XTO Energy Inc. 22777 Springwoods Village Pkwy. Spring, TX 77389*
- (B) **Identification of each hazardous air pollutant (HAP) monitored at the affected source** – *Monitored data is performed on engine exhaust control device and includes the inlet temperature (engine exhaust temperature) and the differential pressure across the catalyst. The oxidation catalyst is required to limit the concentration of formaldehyde in the stationary RICE exhaust to 14 ppmvd or less at 15% O₂. No direct measurement of formaldehyde emissions is required to be performed.*
- (C) **Beginning and ending dates of the reporting period** – *January 1, 2018 – June 30, 2018.*
- (D) **Brief description of the process units** – *Please refer to the attached Table 2.*
- (E) **Emission and operating parameter limitations** – *The oxidation catalyst is required to limit the concentration of formaldehyde in the RICE exhaust to 14 ppmvd or less at 15% O₂ as specified in 40 CFR 63, Subpart ZZZZ – Table 2a.*
- (F) **Monitoring equipment manufacturer and model number** – *Manufacturer: Roesmount ; Model: 248 Hart*
- (G) **Date of the latest CMS certifications or audit** – *A minimum of semi-annual calibrations are conducted on CPMS monitoring equipment. A CPMS Performance Evaluation, which includes a description of the CMS, was conducted on February 12, 2018.*
- (H) **Total operating time of the affected source during the reporting period** – *Please refer to the attached Tables 1 & 2.*
- (I) **Emission data summary**
- **Total duration of excess emissions during the reporting period.**
 - **Total duration of excess emissions expressed as a percent of the total source operating time during the reporting period.**
 - **Breakdown of the total duration of excess emissions during the reporting period according to which are startup/shutdown, control equipment problems. Process problems, other known causes and other unknown causes.**

Reportable excess emissions that occurred during the reporting period are reported in the attached Tables 1 & 2.

Summary Report – Gaseous and Opacity Excess Emission and Continuous Monitoring System Performance – 40 CFR 63.10(e)(3)(vi)

- (J) **CMS performance summary** – *Please refer to the attached Tables 1 & 2.*
- **Total CMS downtime during the reporting period.**
 - **Total duration of CMS downtime expressed as a percent of the total source operating time during that reporting period.**
 - **Breakdown of the total CMS downtime during the reporting period into periods that are due to monitoring equipment malfunctions, non-monitoring equipment malfunctions, quality assurance/quality control calibrations, other known causes and other unknown causes.**
 - *CPMS malfunctions are identified in the attached Tables 1 & 2.*
- (K) **Description of any changes in CMS, processes or controls since the last reporting period:**
- *No changes in CMS, processes or controls during this reporting period.*
- (L) **The report shall consist of a letter containing the name, title, and signature of the responsible official certifying accuracy** – *Please refer to the attached CTAC form.*
- (M) **Date of the report** – *July 30, 2018.*

(A) **40 CFR 63.10(d)(5)(i)** – *The malfunctions described in the attached Tables 1 & 2 that produced excess emissions followed the procedures and associated actions stated in the SSMP in order to minimize emissions during the events. The applicable SSMP procedures are as follows:*

- *Respond within a timely manner upon notification or alarm that the device is in malfunction mode (based on operational parameter malfunction criteria).*
- *Survey the malfunction situation, cause, and the current site conditions.*
- *Based on the initial survey, determine if the conditions permit the safe startup and operation of the device.*
- *If the decision is made to restart the device, conduct the manufacturer's recommended startup procedure as stated in the applicable O&M manual, soon as possible.*
- *If the device cannot be restarted, then notify the appropriate supervisor and conduct a site shutdown assessment under the direction of the appropriate supervisor.*
- *Record any site daily operating parameters that are available and that can be used to demonstrate the operating state of equipment during the malfunction period. Examples of site daily operating parameters that may be recorded include station gas flow rate, compressor downtime and catalyst conditions, and T.O. operating temperature and waste gate bypass mode.*
- *Collect any data that may be stored locally on the PLC or other local data storage device to use for future reference.*
- *Complete all applicable downtime and malfunction logs.*

Please refer to the Summary Report, Section (I) above for further details and the attached Tables 1 & 2.



Table 1 - Roosevelt Downtime Report - Little Canyon Unit

01/01/2018 - 06/30/2018

Western Division - Roosevelt, UT

Table 1 - Tap 5 Compressors

Tap 5 Booster Compressor 2 (T5BC-2) - S/N WPW01800

Tap 5 Booster_ 2 (T5BC-2) Total Source Operating Time		4308.25	Hours
<u>Excess Emissions</u>			
Startup/Shutdown	4.75	Hours	
Control Equipment Problems	0.00	Hours	
Process Problems	0.00	Hours	
Other Known Causes	0.00	Hours	
Unknown Causes	0.00	Hours	
Total Excess Emissions Downtime	4.75	Hours	
Total Excess Emissions Downtime Expressed As A % Of The Total Source Operating Time		0.11%	
<u>CPMS</u>			
Monitoring Equipment Malfunction	0.00	Hours	
Non-Monitoring Equipment Malfunction (Communication Equipment Malfunction)	0.00	Hours	
Quality Assurance/Quality Control Calibration	0.00	Hours	
Other Known Causes	0.00	Hours	
Other Unknown Causes	0.00	Hours	
Total CPMS Downtime	0.00	Hours	
Total CPMS Downtime Expressed As A Percent Of The Total Source Operating Time		0.00%	

Tap 5 Compressor 2 (T5C-2) - S/N 4EK05034

Tap 5 Compressor 2 (T5C-2) Total Source Operating Time		4269.75	Hours
<u>Excess Emissions</u>			
Startup/Shutdown	2.00	Hours	
Control Equipment Problems	0.00	Hours	
Process Problems	0.00	Hours	
Other Known Causes	0.00	Hours	
Unknown Causes	0.00	Hours	
Total Excess Emissions Downtime	2.00	Hours	
Total Excess Emissions Downtime Expressed As Percent Of The Total Source Operating Time		0.05%	
<u>CPMS</u>			
Monitoring Equipment Malfunction	0.00	Hours	
Non-Monitoring Equipment Malfunction (Communication Equipment Malfunction)	0.00	Hours	
Quality Assurance/Quality Control Calibration	0.00	Hours	
Other Known Causes	0.00	Hours	
Other Unknown Causes	0.00	Hours	
Total CPMS Downtime	0.00	Hours	
Total CMS Downtime Expressed As A Percent Of The Total Source Operating Time		0.00%	



XTO Energy Inc

Table 3 - Uintah County, Utah Engine Information

DATE: 7/25/2018

Unit ID#	Facility / Unit Name	Equipment Model #	Mfg. Engine HP	Serial Number	Engine Manufact. Date
TAP-5 Compressor Station					
T5C-2	TAP-5 #2	CAT 3516LE	1340	4EK05034	3/21/2006
T5BC-2	TAP-5 Booster #2	CAT 3516LE	1340	WPW01800	11/2/2007



XTO Energy Inc

Table 4 - Uintah County, Utah Deviation Summary

DATE: 7/25/2018

Reported Date	Equipment Description/Model	Serial No.	Remarks
None - NO DEVIATIONS DURING THE SEMI-ANNUAL REPORTING PERIOD			

APPENDIX A
Compressor Downtime Data



Tap 5 Compressor 2 - Downtime

01/01/2018 - 06/30/2018

Facility ID	Equipment ID	Connective Action Y/N	Event Start Date	Event Start Time	Event End Date	Event End Time	Days	Hours	Minutes	Event Type	Action Type	ISM Code	Corrective Action Comments
Tap5	Comp_2	1	01/04/2018	11:15:00	01/04/2018	13:15:00	0	2	0	Planned	Equipment	MAINT	PM unit.
Tap5	Comp_2	1	01/04/2018	14:30:00	01/04/2018	14:45:00	0	0	15	Unplanned	Equipment	MISC	Change card in PLC.
Tap5	Comp_2	1	01/06/2018	22:30:00	01/06/2018	23:30:00	0	1	0	Unplanned	Equipment	HDP	High 3rd stage discharge pressure. Restarted.
Tap5	Comp_2	1	01/14/2018	12:30:00	01/14/2018	13:00:00	0	0	30	Unplanned	Equipment	HDP	Tap 5 booster 2 down for repair of oil leak on engine.
Tap5	Comp_2	1	01/18/2018	21:15:00	01/18/2018	22:30:00	0	1	15	Unplanned	Equipment	HDP	High 3rd stage discharge pressure due to Tap 5 Booster down.
Tap5	Comp_2	1	01/24/2018	12:00:00	01/24/2018	12:15:00	0	0	15	Unplanned	Equipment	HDP	High discharge pressure due to Tap 5 B2 down.
Tap5	Comp_2	1	02/01/2018	12:15:00	02/01/2018	14:30:00	0	2	15	Planned	Equipment	MAINT	PM unit.
Tap5	Comp_2	1	02/20/2018	00:45:00	02/20/2018	02:00:00	0	1	15	Unplanned	Equipment	HDP	High 3rd stage discharge pressure. Tap 5 Booster 2 down due to frozen check valve on discharge line.
Tap5	Comp_2	1	02/20/2018	07:15:00	02/20/2018	07:45:00	0	0	30	Unplanned	Equipment	HDP	High 3rd stage discharge pressure. Tap 5 Booster 2 down due to frozen check valve on discharge line.
Tap5	Comp_2	1	02/20/2018	08:00:00	02/20/2018	09:00:00	0	1	0	Unplanned	Equipment	HSP	High 3rd stage discharge pressure. Tap 5 Booster 2 down due to frozen check valve on discharge line.
Tap5	Comp_2	1	02/21/2018	01:15:00	02/21/2018	03:00:00	0	1	45	Unplanned	Equipment	HDP	High 3rd stage discharge pressure. Sales line frozen. Air to ESD valve on T5B2 frozen.
Tap5	Comp_2	1	02/21/2018	03:45:00	02/21/2018	04:15:00	0	0	30	Unplanned	Equipment	HDP	High 3rd stage discharge pressure. Sales line frozen. Air to ESD valve on T5B2 frozen.
Tap5	Comp_2	1	02/21/2018	04:30:00	02/21/2018	06:30:00	0	2	0	Unplanned	Equipment	HDP	High 3rd stage discharge pressure. Sales line frozen. Air to ESD valve on T5B2 frozen.
Tap5	Comp_2	1	02/21/2018	06:45:00	02/21/2018	07:15:00	0	0	30	Unplanned	Equipment	HDP	High 3rd stage discharge pressure. Sales line frozen. Air to ESD valve on T5B2 frozen.
Tap5	Comp_2	1	02/22/2018	10:45:00	02/22/2018	11:45:00	0	1	0	Unplanned	Equipment	HDP	High 3rd stage discharge pressure as Tap 5 Booster 2 is down due to frozen recirc. valve.
Tap5	Comp_2	1	02/24/2018	05:30:00	02/24/2018	07:30:00	0	2	0	Unplanned	Equipment	HDP	High 3rd stage discharge pressure. Closed louvers on cooler. Reset and start.
Tap5	Comp_2	1	03/01/2018	10:00:00	03/01/2018	11:45:00	0	1	45	Planned	Equipment	MOM	PM Unit Restart
Tap5	Comp_2	1	03/12/2018	09:15:00	03/12/2018	09:30:00	0	0	15	Unplanned	Equipment	HST	R&R
Tap5	Comp_2	1	03/29/2018	15:45:00	03/29/2018	16:15:00	0	0	30	Unplanned	Equipment	HST	Auto Reset & Restart
Tap5	Comp_2	1	04/05/2018	09:45:00	04/05/2018	12:00:00	0	2	15	Planned	Equipment	MOM	PM unit.
Tap5	Comp_2	1	04/12/2018	11:00:00	04/12/2018	11:45:00	0	0	45	Unplanned	Equipment	HSL	High 3rd stage scrubber level. Restarted.
Tap5	Comp_2	1	04/14/2018	21:30:00	04/15/2018	07:30:00	0	10	0	Unplanned	Equipment	VFD	Program in new VFD.
Tap5	Comp_2	1	04/16/2018	11:30:00	04/16/2018	15:00:00	0	2	30	Planned	Equipment	MISC	MSO shutdown for PRV testing.
Tap5	Comp_2	1	04/17/2018	08:30:00	04/17/2018	13:45:00	0	5	15	Planned	Equipment	HDP	High 3rd stage discharge pressure due to testing PRV's at T5-B2.
Tap5	Comp_2	1	04/28/2018	19:30:00	04/29/2018	08:00:00	0	12	30	Unplanned	Equipment	LDP	Reset & Start
Tap5	Comp_2	1	04/29/2018	14:30:00	04/29/2018	15:00:00	0	0	30	Unplanned	Equipment	LDP	Low 2nd stage discharge pressure. Reset and start.
Tap5	Comp_2	1	04/30/2018	13:00:00	04/30/2018	13:15:00	0	0	15	Unplanned	Equipment	MISC	Fix loose wires.
Tap5	Comp_2	1	05/01/2018	12:30:00	05/01/2018	12:45:00	0	0	15	Unplanned	Equipment	LDP	Low 2nd stage discharge pressure. Changed 2nd stage pressure transducer.
Tap5	Comp_2	1	05/01/2018	13:45:00	05/01/2018	14:00:00	0	0	15	Unplanned	Equipment	LDP	Low 2nd stage discharge pressure. Changed 2nd stage pressure transducer.
Tap5	Comp_2	1	05/03/2018	10:15:00	05/03/2018	14:00:00	0	3	45	Planned	Equipment	MAINT	PM unit.
Tap5	Comp_2	1	05/25/2018	14:15:00	05/25/2018	14:30:00	0	0	15	Unplanned	Equipment	HST	Restarted.
Tap5	Comp_2	1	06/04/2018	15:15:00	06/04/2018	15:30:00	0	0	15	Unplanned	Equipment	HDT	High 3rd Stage Discharge Pressure, Reset & Restart
Tap5	Comp_2	1	06/04/2018	16:00:00	06/04/2018	16:15:00	0	0	15	Unplanned	Equipment	HDP	High 3rd Stage Discharge Pressure, Reset & Restart
Tap5	Comp_2	1	06/04/2018	15:30:00	06/04/2018	16:15:00	0	0	45	Unplanned	Equipment	HDP	High 2nd Stage Discharge Pressure, Reset & Restart
Tap5	Comp_2	1	06/04/2018	16:30:00	06/04/2018	17:00:00	0	0	30	Unplanned	Equipment	HDP	High 2nd Stage Discharge Pressure, Reset & Restart
Tap5	Comp_2	1	06/05/2018	07:30:00	06/05/2018	09:15:00	0	1	45	Planned	Equipment	HDP	High 3rd stage discharge pressure due to PM on T5B2.
Tap5	Comp_2	1	06/12/2018	02:00:00	06/12/2018	04:45:00	0	2	45	Unplanned	Equipment	LCL	Bad wires. Repaired wiring.
Tap5	Comp_2	1	06/13/2018	06:00:00	06/14/2018	14:00:00	1	8	0	Unplanned	Equipment	MOM	Down for top and overhaul, head replacement.
Tap5	Comp_2	1	06/23/2018	14:15:00	06/23/2018	14:30:00	0	0	15	Planned	Equipment	MOM	Testing Tank Kills
Tap5	Comp_2	1	06/29/2018	06:30:00	06/29/2018	07:15:00	0	0	45	Unplanned	Equipment	LCL	Added coolant, reset and restart.
							24	60	14:25				



Tap 5 Booster 2 - Downtime
XTO Energy - Roosevelt, UT
01/01/2018 - 06/30/2018

Facility ID	Equipment	Event Start Date	Event Start Time	Event End Date	Event End Time	Days	Hours	Minutes	Event Type	Asset Type	Asset Code	Corrective Action Comments
Tap5	Booster_2	01/04/2018	12:00:00	01/04/2018	14:00:00	0	2	0	Planned	Equipment	MAINT	PM unit.
Tap5	Booster_2	01/06/2018	23:45:00	01/07/2018	00:00:00	0	1	15	Unplanned	Equipment	LSP	Clean out airfines. Reset and start.
Tap5	Booster_2	01/07/2018	00:30:00	01/07/2018	00:45:00	0	0	15	Unplanned	Equipment	LSP	Lower flow to generator.
Tap5	Booster_2	01/07/2018	06:15:00	01/07/2018	06:30:00	0	0	15	Unplanned	Equipment	HST	Restarted.
Tap5	Booster_2	01/14/2018	12:45:00	01/14/2018	13:30:00	0	0	45	Unplanned	Equipment	NCM	Repair oil leak on engine.
Tap5	Booster_2	01/18/2018	21:30:00	01/18/2018	23:15:00	0	1	45	Unplanned	Equipment	ECV	Coaster vibration due to short in wiring going to vibration sensor started repair on wiring.
Tap5	Booster_2	01/24/2018	12:15:00	01/24/2018	13:00:00	0	0	45	Unplanned	Equipment	LSP	Restarted.
Tap5	Booster_2	02/01/2018	13:00:00	02/01/2018	15:15:00	0	2	15	Planned	Equipment	MAINT	PM unit.
Tap5	Booster_2	02/20/2018	01:00:00	02/20/2018	03:00:00	0	2	0	Unplanned	Equipment	LSP	Recirc valve frozen.
Tap5	Booster_2	02/20/2018	04:00:00	02/20/2018	04:15:00	0	0	15	Unplanned	Equipment	LSP	Recirc valve frozen.
Tap5	Booster_2	02/20/2018	08:15:00	02/20/2018	08:30:00	0	0	15	Unplanned	Equipment	LSP	Recirc valve frozen.
Tap5	Booster_2	02/20/2018	09:00:00	02/20/2018	09:15:00	0	0	15	Unplanned	Equipment	LSP	Recirc valve frozen.
Tap5	Booster_2	02/20/2018	09:30:00	02/20/2018	09:45:00	0	0	15	Unplanned	Equipment	LSP	Recirc valve frozen.
Tap5	Booster_2	02/21/2018	04:15:00	02/21/2018	04:30:00	0	0	15	Unplanned	Equipment	LSP	Air supply to ESD valve frozen.
Tap5	Booster_2	02/21/2018	04:45:00	02/21/2018	05:00:00	0	0	15	Unplanned	Equipment	LSP	Air supply to ESD valve frozen.
Tap5	Booster_2	02/21/2018	06:15:00	02/21/2018	06:30:00	0	0	15	Unplanned	Equipment	LSP	Air supply to ESD valve frozen.
Tap5	Booster_2	02/21/2018	06:45:00	02/21/2018	06:45:00	0	1	0	Unplanned	Equipment	LSP	Air supply to ESD valve frozen.
Tap5	Booster_2	02/21/2018	07:30:00	02/21/2018	07:45:00	0	0	15	Unplanned	Equipment	LSP	Air supply to ESD valve frozen.
Tap5	Booster_2	02/22/2018	11:30:00	02/22/2018	12:15:00	1	1	45	Unplanned	Equipment	LSP	Frozen recirc valve.
Tap5	Booster_2	02/22/2018	12:30:00	02/22/2018	14:30:00	0	2	0	Unplanned	Equipment	LSP	Frozen recirc valve.
Tap5	Booster_2	03/01/2018	10:30:00	03/01/2018	12:30:00	0	2	0	Planned	Equipment	NCM	PM Unit.
Tap5	Booster_2	03/29/2018	16:15:00	03/29/2018	17:00:00	0	0	45	Unplanned	Equipment	LSP	R&R.
Tap5	Booster_2	03/30/2018	09:30:00	03/30/2018	09:45:00	0	0	15	Planned	Equipment	LSP	R&R.
Tap5	Booster_2	04/05/2018	10:30:00	04/05/2018	12:45:00	0	2	15	Planned	Equipment	NCM	PM unit.
Tap5	Booster_2	04/17/2018	08:45:00	04/17/2018	15:00:00	0	6	15	Planned	Equipment	MSC	Down due to testing PRV's.
Tap5	Booster_2	05/03/2018	10:45:00	05/03/2018	14:45:00	0	4	0	Planned	Equipment	MAINT	PM unit.
Tap5	Booster_2	06/05/2018	07:45:00	06/05/2018	10:00:00	0	2	15	Planned	Equipment	NCM	PM unit.
						24	28	7.75				

APPENDIX A
Compressor Runtime Data



Tap 5
Roosevelt - Compressor Continuous Monitoring Report (CPMS)
1/1/2018 12:00:00 AM - 7/1/2018 12:00:00 AM

Site Name	DateTime	Comp 2 Inlet Temp	Comp 2 Run Status	Reason for Downtime	Resolution
Tap 5	2018-04-16 15:00	186	Running	MISC	MSO shutdown for PRV testing.
Tap 5	2018-02-20 02:00	218	Running	HDP	High 3rd stage discharge pressure. Tap 5 Booster 2 down sue to frozen check valve on discharge line.
Tap 5	2018-02-21 06:30	373	Running	HDP	High 3rd stage discharge pressure. Sales line frozen. Air to ESD valve on T5B2 frozen.
Tap 5	2018-02-21 03:00	397	Running	HDP	High 3rd stage discharge pressure. Sales line frozen. Air to ESD valve on T5B2 frozen.
Tap 5	2018-04-05 12:00	399	Running	MOM	PM unit.
Tap 5	2018-02-21 03:30	427	Running	HDP	High 3rd stage discharge pressure. Sales line frozen. Air to ESD valve on T5B2 frozen.
Tap 5	2018-01-06 23:30	437	Running	HDP	High 3rd stage discharge pressure due to Tap 5 Booster down.
Tap 5	2018-02-20 09:00	444	Running	HDP	High 3rd stage discharge pressure. Tap 5 Booster 2 down sue to frozen check valve on discharge line.



Tap 5 Booster
Roosevelt - Compressor Continuous Monitoring Report (CPMS)
1/1/2018 12:00:00 AM - 7/1/2018 12:00:00 AM

Site Name	DateTime	Comp 2 Inlet Temp	Comp 2 Run Status	Reason for Downtime	Resolution
Tap 5 Booster	4/5/2018 12:45	129	Running MOM	PM unit.	
Tap 5 Booster	1/4/2018 14:00	148	Running MAINT	PM unit.	
Tap 5 Booster	1/7/2018 0:00	151	Running LSP	Lower max to governor.	
Tap 5 Booster	2/21/2018 6:45	239	Running LSP	Air supply to ESD valve frozen.	
Tap 5 Booster	2/21/2018 7:45	257	Running LSP	Air supply to ESD valve frozen.	
Tap 5 Booster	5/3/2018 14:45	261	Running MAINT	PM unit.	
Tap 5 Booster	1/14/2018 13:30	277	Running MOM	Repair oil leak on engine.	
Tap 5 Booster	4/17/2018 15:00	281	Running MISC	Down due to testing PRV's.	
Tap 5 Booster	2/21/2018 5:00	282	Running LSP	Air supply to ESD valve frozen.	
Tap 5 Booster	3/1/2018 12:30	296	Running MOM	PM Unit	
Tap 5 Booster	3/29/2018 16:45	315	Running LSP	R&R	
Tap 5 Booster	2/21/2018 5:30	360	Running LSP	Air supply to ESD valve frozen.	
Tap 5 Booster	2/22/2018 14:30	369	Running LSP	Frozen recirc. valve.	
Tap 5 Booster	2/20/2018 8:30	392	Running LSP	Recirc valve frozen.	
Tap 5 Booster	2/21/2018 7:00	393	Running LSP	Air supply to ESD valve frozen.	
Tap 5 Booster	2/21/2018 4:30	411	Running LSP	Air supply to ESD valve frozen.	
Tap 5 Booster	2/21/2018 7:15	435	Running LSP	Air supply to ESD valve frozen.	
Tap 5 Booster	2/20/2018 3:00	439	Running LSP	Recirc valve frozen.	
Tap 5 Booster	4/17/2018 16:15	450	Running MISC	Down due to testing PRV's.	

Work Order

WO No.: 4222	Open / History: O
WO Date: 02/01/2018	Completed Date:
WO Time: 06:54:23	WO Type: PM
Asset ID: TAP5C2	Comments:
Asset Description: COMPRESSOR TAP 5 C-2	
PARENT ASSET ID: TAP5	Requested By: P.M. Schedule
Serial Number: 4EK05034	Assign To: XTO Energy (Brian Goodrich)
	Perform For:
Assign To Type: Automation	Supervisor: DANNY98 Danny Farnsworth
Perform For Type:	Supervisor Type: Employee
Request #: Go To	Brief Description: CALIBRATIONS
Weblink:	Work Due Date:
Work Description: Semi-Annual CPMS CALIBRATIONS	
Work Description Page 2:	

Jan 12-18

Dan

CPMS TEMPERATURE TRANSMITTER CALIBRATION

LOCATION _____ Tap #5

COMPRESSOR NUMBER _____ #2

DEHYDRATOR NUMBER _____ DATE _____ 2/12/2018 TIME _____ 2:31 PM

TRANSMITTER MAKE _____ Roesmount

Cal Equipment Description: Fluke 725Ex

TRANSMITTER MODEL _____ 248 Hart

Cal Equipment S/N: 1576042

Date of last Annual Calibration: 4/11/2016

TRANSMITTER SERIAL _____ 218603

RTD RANGE _____

THERMOCOUPLE RANGE _____ 0-1500

RTD TYPE _____

THERMOCOUPLE TYPE _____ K

AS FOUND READING

RTU _____ 750

TRANSMITTER _____ 752

LEFT AS READING

RTU _____ 750

TRANSMITTER _____ 752

DEG	VOLT/mA
0	4.002
750	12.002
1500	20.002

DEG	VOLT/mA
0	
750	
1500	

CALIBRATION REQUIRED No

REASON FOR CALIBRATION (CIRCLE ONE)

SEMI ANNUAL

DESCRIBE MALFUNCTION _____

MALFUNCTION CORRECTED YES / NO

STEPS TAKEN TO CORRECT MalfunTION _____

Jeremy Roberts, Joe Long

TECH



2/12/2018

DATE

Work Order

WO No.: 4223	Open / History: 0
WO Date: 02/01/2018	Completed Date:
WO Time: 06:54:23	WO Type: PM
Asset ID: TAP5BOOC2	Comments:
Asset Description: COMPRESSOR TAP 5 BOOSTER C-2	
PARENT ASSET ID: TAP5BOOSTER	Requested By: P.M. Schedule
Serial Number: WPW01800	Assign To: XTO Energy (Brian Goodrich)
	Perform For:
Assign To Type: Automation	Supervisor: DANNY98 Danny Farnsworth
Perform For Type:	Supervisor Type: Employee
Request #: Go To	Brief Description: CALIBRATIONS
Weblink:	Work Due Date:
Work Description: Semi-Annual CPMS CALIBRATIONS	

Work Description Page 2:

Don

Completed

Brian Goodrich 2-9-2018

CPMS TEMPERATURE TRANSMITTER CALIBRATION

LOCATION _____ Tap #5 Booster

COMPRESSOR NUMBER _____ Booster

DEHYDRATOR NUMBER _____ DATE _____ 2/2/2018 TIME _____ 1:30 P.M.

TRANSMITTER MAKE _____ Roesmount

Cal Equipment Description: Fluke 725Ex

TRANSMITTER MODEL _____ 248 Hart

Cal Equipment S/N: 1575087

renewal date 2/28/2018

TRANSMITTER SERIAL _____ 218539

RTD RANGE _____

THERMOCOUPLE RANGE _____ 0-1500

RTD TYPE _____

THERMOCOUPLE TYPE _____ K

AS FOUND READING

RTU _____ 751

TRANSMITTER _____ 750

DEG	VOLT/mA
0	4
750	12
1500	20

LEFT AS READING

RTU _____ 751

TRANSMITTER _____ 750

DEG	VOLT/mA
0	4
750	12
1500	20

CALIBRATION REQUIRED No

REASON FOR CALIBRATION (CIRCLE ONE)

SEMI ANNUAL

DESCRIBE MALFUNCTION _____

MALFUNCTION CORRECTED YES / NO

STEPS TAKEN TO CORRECT MALFUNCTION _____

Brian Goodrich Joe Long

TECH

2/2/2018

DATE